9/30/92 8400.10 CHG 7

SECTION 2. HELICOPTER EN ROUTE DESCENT AREAS (HEDA'S)

1553. GENERAL. This section contains direction and guidance to be used by principal operations inspectors (POI's) for approving HEDA's.

1555. REQUEST FOR APPROVAL OF HEDA. Any operator that desires to establish a HEDA shall submit a written request to its certificate-holding district office (CHDO), which will provide a copy of this request to the flight standards field office in whose geographic area of responsibility the operations are proposed. The letter of request from the operator should include the following items:

- A pictorial and/or written description of the proposed HEDA
- The means by which positive course guidance is to be established
- Equipment requirements for use in the HEDA
- Operations and training manual revisions to incorporate HEDA's, if it is an initial application
- The date of first intended use and the proposed length of service for which authorization is sought

1557. DISTRICT **OFFICE** APPROVAL PROCEDURES. When the CHDO receives an application for a HEDA that involves a flight standards district office (FSDO) outside of its region, the CHDO should immediately contact the other FSDO through the regional flight standards division (RFSD) to ensure a timely implementation of the request. This would include, but not be limited to, the appropriate air traffic division/facility and the RFSD, operations branch, where the operations are proposed. When operations are proposed outside the certificate-holding region, coordination among all concerned parties should be completed before the CHDO issues operations specifications (OpSpecs) or a letter of authorization.

A. *Offshore Operators*. Part 91 offshore operators are required to obtain a letter of authorization from the FSDO for IFR operations. The letter of authorization shall be

issued once all certification requirements are met. All offshore operators are required to meet the same certification standards. A sample letter of authorization is contained in figure 4.7.2.1.

- B. Navigational Equipment. POI's must coordinate with principal avionics inspectors (PAI's) to ensure that the navigational equipment required, including radar altimeter and mapping radar, is appropriately installed and approved for the proposed type of operation. If routes of flight are predicated on the use of an area navigation system (RNAV), the POI must assure compliance with Advisory Circular (AC) 90-45, "Approval of Area Navigation Systems," for use in the U.S. national airspace system.
- C. Coordination with the Procedures Branch. POI's, in conjunction with a flight inspection procedures specialist, must determine that the proposed HEDA is clear of obstructions and that positive course guidance is available for the entire route, including descent to the lowest authorized altitude (LAA).
- D. Extended Overwater or IFR Operations Equipment. The POI must determine that all navigation equipment to be used in these operations complies with the requirements of FAR 135.165(b). If positive course guidance for any portion of the route is obtained through the use of long-range navigation equipment (i.e., VLF/OMEGA, LORAN, etc.), two independent receivers for navigation must be installed and be operative before the POI can issue authorization to the operator to use that HEDA.
- E. *Issuance of OpSpecs*. When POI's are satisfied that all requirements are met and that appropriate coordination with airworthiness, avionics, and the procedures branch of the FAA has been accomplished, OpSpecs may be issued to the operator.
- (1) Authorization Limit. OpSpecs authorizing the use of HEDA's are valid for one year from the date of issue. Any operator wishing to obtain HEDA revalidation must submit written confirmation to the POI ensuring that the HEDA is clear of obstructions and that positive course guidance is available. The operator must provide the means

Par. 1553 4-949

8400.10 CHG 7 9/30/92

for any on-site inspection by the POI.

1559. HEDA PICTORIAL AND PLAN VIEW CRITERIA.

A. *En Route Criteria*. Figures 4.7.2.2. and 4.7.2.3. portray the en route dimensions contained in FAA Order 8260.3, <u>U.S. Standards for Terminal Instrument Procedures (TERPS)</u>, to be used to develop the primary and secondary areas for HEDA use.

B. *HEDA Dimensions*. HEDA's have the profile of figure 4.7.2.4. and the dimensions of the plan view in figure 4.7.2.5. The descent area begins at the descent fix and ends at the descent altitude fix. This area must be free of obstacles and must be located over water.

C. Equipment Requirements. All required flight and

navigation equipment must be installed and operative to utilize the 400-foot minimums.

D. Inoperative Equipment.

- (1) The LAA will be increased to 700 feet as shown in figure 4.7.2.6. with the radar altimeter inoperative.
- (2) The LAA will be increased to 700 feet as shown in figure 4.7.2.7. with the mapping radar inoperative.

NOTE: When the radar altimeter is inoperative, altitude will be adjusted upward 5 feet for each mile over 5 miles from the altimeter setting source to the descent altitude fix.

1560. - 1570. RESERVED.

4-950 Par. 1559

9/30/92 8400.10 CHG 7

FIGURE 4.7.2.1. SAMPLE LETTER OF AUTHORIZATION FOR USE OF HEDA

(Date) (Company Address)

Dear Sir:

In accordance with your request of (date), (company name) is authorized the use of the following HEDA(s):

- 1. (description of HEDA)
- 2. (etc.)

Equipment Requirements

In addition to compliance with appropriate Federal Aviation Regulations, an airborne weather and mapping radar and radar altimeter must be installed.

Limitations

- 1. A lowest authorized altitude (LAA) of 400 feet is permitted with all equipment operative.
- 2. The LAA will be increased to 700 feet with either the mapping radar or radar altimeter inoperative.
- 3. Altitude will be adjusted upward 5 feet for each mile over 5 miles from the altimeter setting source to the descent altitude fix.
- 4. If upon reaching the LAA and VFR conditions do not exist, a missed approach in accordance with Air Traffic Letters of Agreement of Air Traffic clearance will be initiated.
 - 5. In the event an unplotted target is displayed in the descent area, descent below 700 feet is not authorized.

Unless sooner recalled or amended, this authorization remains valid while (company name) is conducting operations in the areas described above for 1 year from date of issuance. It is the responsibility of (company name) to assure that the above described HEDA is still in effect. Revalidation of this authorization may be accomplished through written confirmation by (company name) or FAA en route inspection to ensure that the HEDA is clear of obstructions and that positive course guidance for the entire route is available.

Sincerely,

/s/ Sam Smith Manager, AEA-FSDO-62 8400.10 CHG 7 9/30/92

FIGURE 4.7.2.2. EN ROUTE CRITERIA (PROFILE VIEW)

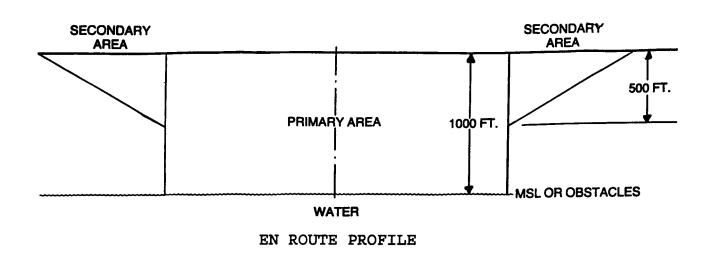
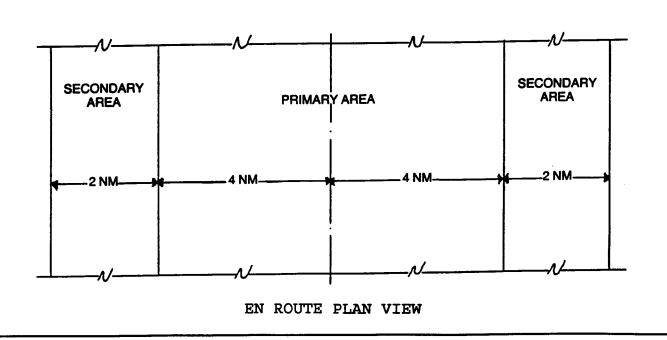


FIGURE 4.7.2.3. EN ROUTE CRITERIA (PLAN VIEW)



9/30/92 8400.10 CHG 7

FIGURE 4.7.2.4. HEDA DIMENSIONS (PROFILE VIEW)

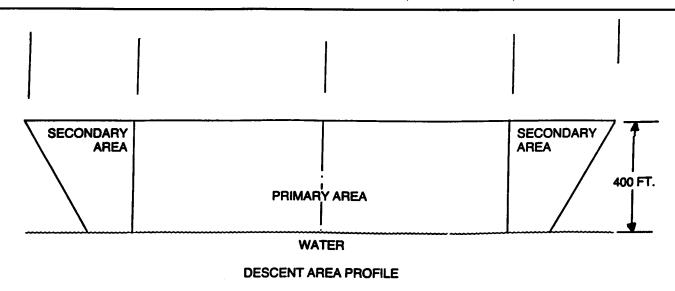
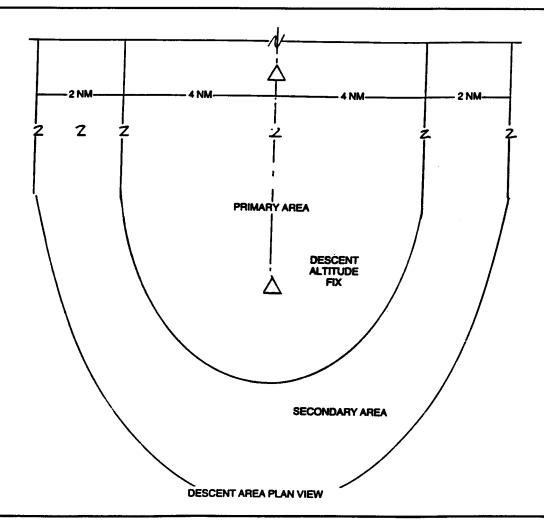


FIGURE 4.7.2.5. HEDA DIMENSIONS (PLAN VIEW)



8400.10 CHG 7 9/30/92

FIGURE 4.7.2.6. INOPERATIVE EQUIPMENT (RADAR ALTIMETER INOP)

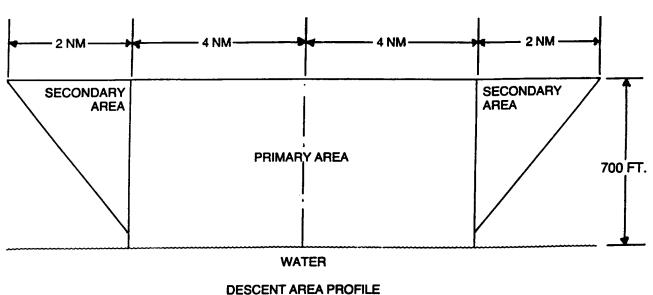
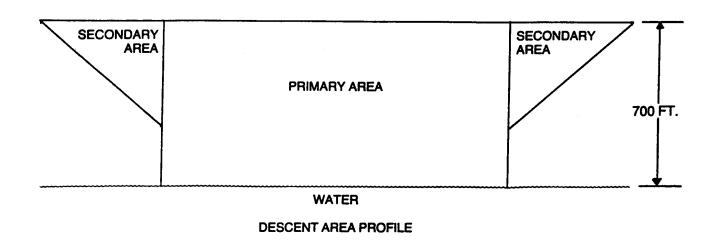


FIGURE 4.7.2.7. INOPERATIVE EQUIPMENT (MAPPING RADAR INOP)



[PAGES 4-955 THROUGH 4-960 RESERVED]